AMENDMENTS TO THE CLAIMS

This listing of claims will replace all prior versions and listings of claims in the application:

LISTING OF CLAIMS:

Claim 1 (currently amended): A transformer, comprising a coil portion having a plurality of windings, and a plurality of cores arranged to sandwich the coil portion ~~from~~ in aligning directions of the windings,

~~wherein the windings includes ring-like portions formed by winding a flat-type wire like a ring to overlap each other~~wherein each winding of said plurality of windings includes a ring-like portion, said ring-like portion comprising a flat wire which is wound in a plurality of turns formed in an overlapping direction of the flat wire;

both end portions of the flat-type wire are led from each of the ring-like portions, respectively;

the plurality of windings and the plurality of cores are arranged along the ~~overlapped~~ overlapping direction of the ~~flat-type~~flat wire of each ring-like portion;

a projected portion is formed on a first core;

the ring-like portions are positioned such that the ring-like portions are fitted on an outer side of the projected portion;

a flat surface portion of a second core is positioned to oppose to the projected portion;

a gap is formed between the flat surface portion and a top end portion of the projected portion, and

the windings are positioned at positions except a position that surrounds the gap.

Claim 2 (original): A transformer according to claim 1, wherein inclined surfaces are formed on the top end portion of the projected portion so that a sectional area of the projected portion is set at the top end portion to be reduced gradually toward a top end surface.

Claim 3 (currently amended): A transformer according to claim 1,

wherein the end portions form leading terminals of the windings, said windings comprising at least one primary winding and at least one secondary winding, and

a width between leading terminals of the at least one primary ~~windings~~ winding and a width between leading terminals of the at least one secondary ~~windings~~ winding are differentiated.

Claim 4 (original): A transformer according to claim 1,

wherein two outer leg portions, for covering a part of the coil portion from an outer periphery side, positioned mutually on opposite sides to put the coil portion therebetween, are provided to the first core, and

mutually-opposing surfaces of the two outer leg portions are formed straightly in parallel.

Claim 5 (new): A transformer, comprising:

a core including a first core part and a second core part; and

a plurality of windings between the first core part and the second core part;

wherein a projected portion is formed on the first core part and the second core part is positioned to oppose to the projected portion;

a gap is formed between the second core part and a top end portion of the projected portion; and

the windings are positioned at positions on an outer side of the projected portion except a position that surrounds the gap.

Claim 6 (new): A transformer according to claim 5, wherein said windings are flat wire sections which are wound in a plurality of turns formed in an overlapping direction of the flat wire.

Claim 7 (new): A transformer, comprising:

a core including a first core part and a second core part, wherein a projected portion is formed on the first core part; and

a plurality of windings which are flat wire sections wound in a plurality of turns formed in an overlapping direction of the flat wire, said plurality of windings surrounding the projected portion of the first core part;

wherein the first core part and the second core part are arranged to sandwich the plurality of windings.

Claim 8 (new): The transformer according to claim 1, wherein the windings comprises a plurality of primary windings and a plurality of second windings,

each of the plurality of second windings is put between two of the plurality of primary windings.